

Kickapoo River Watershed

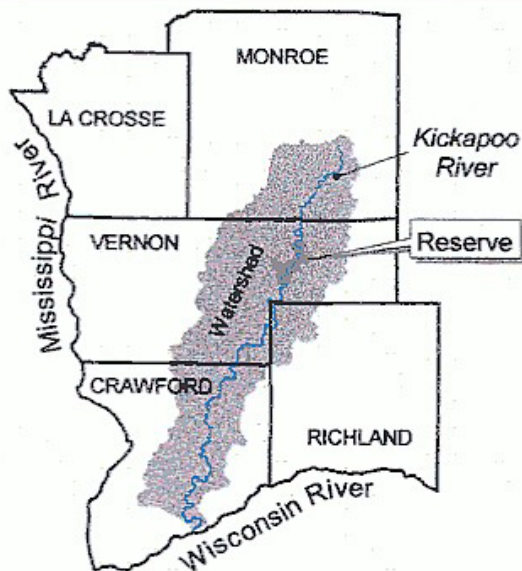
BACKGROUND

The Kickapoo River Watershed contains over 500 miles of coldwater streams with populations of brown and brook trout. Half of these streams have naturally reproducing trout populations and are essential to the area's economy and rich quality of life. Spring-fed streams throughout the Kickapoo Valley provide habitat for wildlife, fish, and other aquatic species. However, sediment and other nonpoint source pollution are threatening streams and fisheries habitats.

The forests play a vital role in purifying and maintaining clean water. Forest cover prevents soil erosion. Properly managed and protected forests are critical to assuring high quality groundwater recharge to sustain cold water streams.

LOCATION

The Kickapoo River Watershed is a major tributary of the Wisconsin River in the Driftless Area of southwestern Wisconsin. The project is located in Crawford, Monroe, Richland, and Vernon counties.



Kickapoo River Watershed.

ISSUES BEING ADDRESSED

Nonpoint source pollution is the biggest threat to water quality in the watershed. Upland sediment sources were evaluated in the Middle Kickapoo River portion of the watershed in 1994. An estimated 31,811 tons of sediment per year were delivered directly to surface waters in the watershed from cropland, developed areas, pastures, woodlots, and grasslands.

A recent assessment of the Kickapoo Watershed concluded that maintaining groundwater recharge should be a high priority, and that hillsides are likely to be the most critical recharge areas. These hillsides are typically steep and almost always forested.

Several studies in the watershed estimated that approximately 23 percent of the woodlands are grazed. Woodland grazing reduces the humus layer and compacts the soil, leading to increased runoff, gully formation, and erosion during periods of snowmelt and rain.

GOALS

The Wisconsin Department of Natural Resources (DNR) and the Wisconsin Land and Water Conservation Association (WLWCA) administered the project. The project goals included:

- Partnering with other conservation organizations to promote forest stewardship and watershed protection.
- Educating landowners about forest harvesting Best Management Practices (BMPs).
- Conducting BMP monitoring on timber sales in the driftless area, which was largely ignored during previous statewide monitoring efforts.

METHODOLOGY

The project focused on reducing the amount of pollutants that enter streams and groundwater. The project promoted watershed protection through the development of forest stewardship plans for landowners who voluntarily seek to protect their woodlands from grazing, plant trees on highly erodible soils, improve the condition of previously harvested sites, regenerate oak woodlands, and utilize BMPs to protect streams in all forest activities. The following methods were used during the project:

Since 1999, the Northeastern Area and the Northeastern Area Association of State Foresters have sponsored a cooperative challenge grants program to promote watershed health and restoration through the conservation, restoration, and sound stewardship of trees and forests.

- Reduce woodland grazing through fencing cost-share, one-on-one contacts, and education.
- Plant trees on highly erodible soils through cost sharing for tree establishment, loan tree planters and sprayers to landowners, and promote tree programs and nursery stock.
- Educate loggers and landowners about using forestry BMPs to improve water quality through workshops and permanent demonstrations.
- Work with landowners and businesses to promote oak regeneration using a direct seeding demonstration.
- Conduct BMP monitoring on timber sales within 200 feet of streams, rivers, and lakes.

OUTCOMES AND ACCOMPLISHMENTS

- The Vernon County Land Conservation Department hired a county forester in June 1999.
- Timber sale monitoring has been conducted on 31 sites during the past two years in the Kickapoo River Watershed.
- Sixty-eight loggers attended two 8-hour classroom and field Forestry BMP Workshops held in the watershed.
- The methodology for locating recent and active timber harvests by aerial surveys was successfully implemented for the first time in Wisconsin.
- Agency employees, private landowners, and consultants have attended demonstration projects. The participants' interest and reactions were favorable.
- The Richland County forestry workshop for private landowners was held in August 2001. Topics included timber sale setup, working with a consulting forester, and forestry BMPs.

PARTNERS

- Vernon County Land & Water
- Trout Unlimited – Kickapoo Project
- Natural Resources Conservation Service
- Kickapoo Valley Reserve
- Crawford County Land Conservation Department
- Richland County Land Conservation Department
- Monroe County Land Conservation Department

FUTURE PLANS

The educational components of this project will continue into the future. "We want to demonstrate to landowners there is a proper and improper way to install logging roads. We want to create an awareness," said Jeff Hastings, County Conservationist from the Vernon County Land and Water Conservation Department.

The watershed project is complete, and the final report is being developed.

It has been determined that the Kickapoo River Watershed will be a catalyst for future watershed projects.

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